RAW SEQUENCE LISTING

The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) no errors detected.

Application Serial Number: 10/563,832

Source: I/EWP

Date Processed by STIC: 1-18-06

ENTERED

IFWP

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        RAW SEQUENCE LISTING              DATE: 01/18/2006
        PATENT APPLICATION:  US/10/563,832    TIME: 15:23:58

        Input Set : A:\sequence listing.txt
        Output Set: N:\CRF4\01182006\J563832.raw

      3 <110> APPLICANT: OHIO UNIVERSITY
      4        KOPCHICK, John J.
      5        RIDERS, Markus
      6        COSCHIGANO, Karen T.
      7        GOSNEY, Elahu S.
      9 <120> TITLE OF INVENTION: DIAGNOSIS AND TREATMENT METHODS RELATED TO AGING (AG)
     11 <130> FILE REFERENCE: KOPCHICK8APCT
C--> 13 <140> CURRENT APPLICATION NUMBER: US/10/563,832
C--> 14 <141> CURRENT FILING DATE: 2006-01-09
     16 <150> PRIOR APPLICATION NUMBER: 60/485,422
     17 <151> PRIOR FILING DATE: 2003-07-08
     19 <160> NUMBER OF SEQ ID NOS: 27
     21 <170> SOFTWARE: PatentIn version 3.3
     23 <210> SEQ ID NO: 1
     24 <211> LENGTH: 263
     25 <212> TYPE: DNA
     26 <213> ORGANISM: Mus sp.
     28 <400> SEQUENCE: 1
     29 tatggcaaag atttggtgga gaaggccaag acctcagaga ttcagagcca ggtcaaggca    60
     31 cactttgaga agacacacga gcagctgaca ccccttgtca ggtcagcagg aactagtctg   120
     33 gtgaacttct tcagcagttt aatgaacctc gaggagaaac cggctcctgc ggctaagtga   180
     35 gatgtgccag gcccagtctt cccaccccag ctgctccact ggccaccgct agagcccctc   240
     37 tccctacctt ctgcctgttt tct                                           263
     40 <210> SEQ ID NO: 2
     41 <211> LENGTH: 865
     42 <212> TYPE: DNA
     43 <213> ORGANISM: Mus sp.
     46 <220> FEATURE:
     47 <221> NAME/KEY: misc_feature
     48 <222> LOCATION: (172)..(173)
     49 <223> OTHER INFORMATION: n is unknown.
     51 <220> FEATURE:
     52 <221> NAME/KEY: misc_feature
     53 <222> LOCATION: (320)..(320)
     54 <223> OTHER INFORMATION: n is unknown.
     56 <400> SEQUENCE: 2
     57 acgcggggaa ttccaattct ccaggcatac gcgtataaca actcggataa ccattgttag    60
     59 ttaatcagac tataggcaat aatcacacta taaataatcc acctataact tctctgttaa   120
W--> 61 cccaacaccg gaatgcctaa aggaaagatc caaaaagata aaggaactc gnnaaacaag    180
     63 aaccccgcct gtttaccaaa aacatcacct ctagcattac aagtattaga ggcactgcct   240
     65 gcccagtgac taaagtttaa cggccgcggt atcctgaccg tgcaaaggta gcataatcac   300
     67 ttgttcctta attagggacn agcagaacgg ctaaacgagg gtccaactgt ctctttatct   360
     69 ttaatcagtg aaattgacct ttcagtgaag aggctgaaat ataataataa gacgagaaga   420
```

RAW SEQUENCE LISTING   DATE: 01/18/2006
PATENT APPLICATION: US/10/563,832   TIME: 15:23:58

Input Set : **A:\sequence listing.txt**
Output Set: **N:\CRF4\01182006\J563832.raw**

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 71 ccctatggag cttaaattat ataacttatc tatttaattt attaaaccta atggcccaaa    480
 73 aactatagta taagtttgaa atttcggttg gggtgacctc ggagaataaa aaatcctccg    540
 75 aatgattata acctagactt acaagtcaaa gtaaaatcaa catatcttat tgacccagat    600
 77 atattttgat caacggacca agttacccta gggataacag cgcaatccta tttaagagtt    660
 79 catatcgaca attagggttt acgacctcga tgttggatca·ggacatccca atggtgtaga    720
 81 agctattaat ggttcgtttg ttcaacgatt aaagtcctac gtgatctgag ttcagaccgg    780
 83 agcaatccag gtcggtttct atctatttac gatttctccc agtacctcgg ccgcgaccac    840
 85 gctaagggcg aattccagca cactg                                          865
 88 <210> SEQ ID NO: 3
 89 <211> LENGTH: 387
 90 <212> TYPE: DNA
 91 <213> ORGANISM: Mus sp.
 93 <400> SEQUENCE: 3
 94 acgcgggggt ggaaaggcga ccatgcttct ctgctctgac agttgatgaa acatatgtcc     60
 96 ccaaagagtt taaagctgag accttcacct tccactctga tatctgcaca cttccagaga    120
 98 aggagaaaca gattaagaaa caaacggctc ttgctgagct ggtgaagcac aagcccaagg    180
100 ctacagcgga gcaactgaag actgtcatgg atgactttgc acagttcctg gatacatgtt    240
102 gcaaggctgc tgacaaggac acctgcttct cgactgaggg tccaaacctt gtcactagat    300
104 gcaaagacgc cttagcctaa acacatcaca accacaacct tctcaggcta ccctgagaaa    360
106 aaaagacatg aagactcagg actcatc                                        387
109 <210> SEQ ID NO: 4
110 <211> LENGTH: 711
111 <212> TYPE: DNA
112 <213> ORGANISM: Mus sp.
115 <220> FEATURE:
116 <221> NAME/KEY: misc_feature
117 <222> LOCATION: (523)..(523)
118 <223> OTHER INFORMATION: n is unknown.
120 <220> FEATURE:
121 <221> NAME/KEY: misc_feature
122 <222> LOCATION: (543)..(543)
123 <223> OTHER INFORMATION: n is unknown.
125 <220> FEATURE:
126 <221> NAME/KEY: misc_feature
127 <222> LOCATION: (579)..(579)
128 <223> OTHER INFORMATION: n is unknown.
130 <220> FEATURE:
131 <221> NAME/KEY: misc_feature
132 <222> LOCATION: (587)..(587)
133 <223> OTHER INFORMATION: n is unknown.
135 <220> FEATURE:
136 <221> NAME/KEY: misc_feature
137 <222> LOCATION: (612)..(612)
138 <223> OTHER INFORMATION: n is unknown.
140 <220> FEATURE:
141 <221> NAME/KEY: misc_feature
142 <222> LOCATION: (615)..(615)
143 <223> OTHER INFORMATION: n is unknown.
145 <220> FEATURE:
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RAW SEQUENCE LISTING   DATE: 01/18/2006
PATENT APPLICATION: US/10/563,832   TIME: 15:23:58

Input Set : **A:\sequence listing.txt**
Output Set: **N:\CRF4\01182006\J563832.raw**

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146 <221> NAME/KEY: misc_feature
147 <222> LOCATION: (625)..(625)
148 <223> OTHER INFORMATION: n is unknown.
150 <220> FEATURE:
151 <221> NAME/KEY: misc_feature
152 <222> LOCATION: (639)..(639)
153 <223> OTHER INFORMATION: n is unknown.
155 <220> FEATURE:
156 <221> NAME/KEY: misc_feature
157 <222> LOCATION: (647)..(647)
158 <223> OTHER INFORMATION: n is unknown.
160 <220> FEATURE:
161 <221> NAME/KEY: misc_feature
162 <222> LOCATION: (657)..(658)
163 <223> OTHER INFORMATION: n is unknown.
165 <220> FEATURE:
166 <221> NAME/KEY: misc_feature
167 <222> LOCATION: (663)..(663)
168 <223> OTHER INFORMATION: n is unknown.
170 <220> FEATURE:
171 <221> NAME/KEY: misc_feature
172 <222> LOCATION: (675)..(675)
173 <223> OTHER INFORMATION: n is unknown.
175 <220> FEATURE:
176 <221> NAME/KEY: misc_feature
177 <222> LOCATION: (677)..(677)
178 <223> OTHER INFORMATION: n is unknown.
180 <220> FEATURE:
181 <221> NAME/KEY: misc_feature
182 <222> LOCATION: (682)..(682)
183 <223> OTHER INFORMATION: n is unknown.
185 <220> FEATURE:
186 <221> NAME/KEY: misc_feature
187 <222> LOCATION: (684)..(684)
188 <223> OTHER INFORMATION: n is unknown.
190 <220> FEATURE:
191 <221> NAME/KEY: misc_feature
192 <222> LOCATION: (692)..(692)
193 <223> OTHER INFORMATION: n is unknown.
195 <220> FEATURE:
196 <221> NAME/KEY: misc_feature
197 <222> LOCATION: (697)..(697)
198 <223> OTHER INFORMATION: n is unknown.
200 <400> SEQUENCE: 4
201 acgcggggca atcgttcacc tcctcttcct ccacgaaaca ggatcaaaca acccaacagg      60
203 attaaactca gatgcagata aaattccatt tcacccccac tatacaatca aagatatcct     120
205 aggtatccta atcatattct taattctcat aaccctagta ttattttttcc cagacatact    180
207 aggagaccca gacaactaca taccagctaa tccactaaac accccacccc atattaaacc     240
209 cgaatgatat ttcctatttg catacgccat tctacgctca atccccaata aactaggagg     300
```

RAW SEQUENCE LISTING   DATE: 01/18/2006
PATENT APPLICATION: US/10/563,832   TIME: 15:23:58

Input Set : A:\sequence listing.txt
Output Set: N:\CRF4\01182006\J563832.raw

```
      211 tgtcctagcc ttaatcttat ctatcctaat tttagcccta atacctttcc ttcatacctc   360
      213 aaagcaacga agcctaatat tccgcccaat cacacaaatt ttgtacctcg gccgcgacca   420
      215 cgctaagggc gaattctgca gatatccatc acactggcgg ccgctcgagc atgcatctag   480
W--> 217 agggcccaat tcgccctata gtgagtcgta ttacaattca ctnggccgtc gtttacaacg   540
      219 tcntgactgg gaaaacccct ggcgttacca aattaatcng cctttgnaaa catccccctt   600
      221 tcgccagctg gncgnaatag cgaanaaggc ccccacccna cgccctncca acagttnncc   660
      223 canctatacc gtacngnatt tnanggttta cncctanaaa aaaaagagcc g            711
      226 <210> SEQ ID NO: 5
      227 <211> LENGTH: 850
      228 <212> TYPE: DNA
      229 <213> ORGANISM: Mus sp.
      232 <220> FEATURE:
      233 <221> NAME/KEY: misc_feature
      234 <222> LOCATION: (39)..(39)
      235 <223> OTHER INFORMATION: n is unknown.
      237 <220> FEATURE:
      238 <221> NAME/KEY: misc_feature
      239 <222> LOCATION: (216)..(216)
      240 <223> OTHER INFORMATION: n is unknown.
      242 <220> FEATURE:
      243 <221> NAME/KEY: misc_feature
      244 <222> LOCATION: (218)..(218)
      245 <223> OTHER INFORMATION: n is unknown.
      247 <220> FEATURE:
      248 <221> NAME/KEY: misc_feature
      249 <222> LOCATION: (572)..(572)
      250 <223> OTHER INFORMATION: n is unknown.
      252 <220> FEATURE:
      253 <221> NAME/KEY: misc_feature
      254 <222> LOCATION: (590)..(590)
      255 <223> OTHER INFORMATION: n is unknown.
      257 <220> FEATURE:
      258 <221> NAME/KEY: misc_feature
      259 <222> LOCATION: (594)..(594)
      260 <223> OTHER INFORMATION: n is unknown.
      262 <220> FEATURE:
      263 <221> NAME/KEY: misc_feature
      264 <222> LOCATION: (600)..(600)
      265 <223> OTHER INFORMATION: n is unknown.
      267 <220> FEATURE:
      268 <221> NAME/KEY: misc_feature
      269 <222> LOCATION: (605)..(605)
      270 <223> OTHER INFORMATION: n is unknown.
      272 <220> FEATURE:
      273 <221> NAME/KEY: misc_feature
      274 <222> LOCATION: (681)..(681)
      275 <223> OTHER INFORMATION: n is unknown.
      277 <220> FEATURE:
      278 <221> NAME/KEY: misc_feature
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279 <222> LOCATION: (693)..(693)
280 <223> OTHER INFORMATION: n is unknown.
282 <220> FEATURE:
283 <221> NAME/KEY: misc_feature
284 <222> LOCATION: (711)..(711)
285 <223> OTHER INFORMATION: n is unknown.
287 <220> FEATURE:
288 <221> NAME/KEY: misc_feature
289 <222> LOCATION: (727)..(727)
290 <223> OTHER INFORMATION: n is unknown.
292 <220> FEATURE:
293 <221> NAME/KEY: misc_feature
294 <222> LOCATION: (730)..(730)
295 <223> OTHER INFORMATION: n is unknown.
297 <220> FEATURE:
298 <221> NAME/KEY: misc_feature
299 <222> LOCATION: (741)..(741)
300 <223> OTHER INFORMATION: n is unknown.
302 <220> FEATURE:
303 <221> NAME/KEY: misc_feature
304 <222> LOCATION: (748)..(748)
305 <223> OTHER INFORMATION: n is unknown.
307 <220> FEATURE:
308 <221> NAME/KEY: misc_feature
309 <222> LOCATION: (764)..(764)
310 <223> OTHER INFORMATION: n is unknown.
312 <220> FEATURE:
313 <221> NAME/KEY: misc_feature
314 <222> LOCATION: (768)..(768)
315 <223> OTHER INFORMATION: n is unknown.
317 <220> FEATURE:
318 <221> NAME/KEY: misc_feature
319 <222> LOCATION: (772)..(772)
320 <223> OTHER INFORMATION: n is unknown.
322 <220> FEATURE:
323 <221> NAME/KEY: misc_feature
324 <222> LOCATION: (774)..(774)
325 <223> OTHER INFORMATION: n is unknown.
327 <220> FEATURE:
328 <221> NAME/KEY: misc_feature
329 <222> LOCATION: (780)..(780)
330 <223> OTHER INFORMATION: n is unknown.
332 <220> FEATURE:
333 <221> NAME/KEY: misc_feature
334 <222> LOCATION: (784)..(784)
335 <223> OTHER INFORMATION: n is unknown.
337 <220> FEATURE:
338 <221> NAME/KEY: misc_feature
339 <222> LOCATION: (786)..(786)
```

RAW SEQUENCE LISTING ERROR SUMMARY   DATE: 01/18/2006
PATENT APPLICATION: US/10/563,832   TIME: 15:23:59

Input Set : **A:\sequence listing.txt**
Output Set: **N:\CRF4\01182006\J563832.raw**

Please Note:
Use of n and/or Xaa have been detected in the Sequence Listing. Please review the
Sequence Listing to ensure that a corresponding explanation is presented in the <220>
to <223> fields of each sequence which presents at least one n or Xaa.

```
Seq#:2; N Pos. 172,173,320
Seq#:4; N Pos. 523,543,578,587,612,615,625,639,647,657,658,663,675,677,682
Seq#:4; N Pos. 684,692,697
Seq#:5; N Pos. 39,216,218,572,590,594,600,605,681,693,711,727,730,741,748
Seq#:5; N Pos. 764,768,772,774,780,784,786,788,793,798,799,812,829,833,841
Seq#:5; N Pos. 844,845
Seq#:6; N Pos. 839
Seq#:11; N Pos. 13,14,15,24,33,52,87,89,104,112,114,138,144,154,169,196,198
Seq#:11; N Pos. 201,204,273,289,296,298,300
```

VERIFICATION SUMMARY   DATE: 01/18/2006
PATENT APPLICATION: **US/10/563,832**   TIME: 15:23:59

Input Set : **A:\sequence listing.txt**
Output Set: **N:\CRF4\01182006\J563832.raw**

```
L:13 M:270 C: Current Application Number differs, Replaced Current Application Number
L:14 M:271 C: Current Filing Date differs, Replaced Current Filing Date
L:61 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:2 after pos.:120
M:341 Repeated in SeqNo=2
L:217 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:4 after pos.:480
M:341 Repeated in SeqNo=4
L:383 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:5 after pos.:0
M:341 Repeated in SeqNo=5
L:452 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:6 after pos.:780
L:826 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:11 after pos.:0
M:341 Repeated in SeqNo=11
```